XXXVI.—List of Coleoptera received from Old Calabar, on the West Coast of Africa. By Andrew Murray, Edinburgh.

[Continued from p. 123.]

Sphæridiidæ.

CYCLONOTUM, Erich.

1. C. Mulsanti, mihi.

Nigrum, nitidum, convexum, subtilissime punctatum. Elytris lateribus fortiter declivis, versus apicem repansis, decempunctato-striatis, striis postice profundioribus; interstitiis sine punctis majoribus, stria suturali scutellum attingente, et ceteris profundiore, striis sextis et septimis haud marginem attingentibus, ceteris utrinque inclusis. Pedibus piceis.

Long.  $2\frac{1}{4}$  lin., lat.  $1\frac{1}{2}$  lin.

Shining black, convex, very finely punctate. Head very smooth, with the faintest trace of a lowering of the surface on each side of the middle of the front before the eyes. Thorax deeply emarginate in front, with the anterior angles projecting; sides with margins slightly edged, and somewhat rounded in to the posterior angles. Scutellum moderate. Elytra with ten punctate striæ, which are deepest at the apex; the interstices are not impressed with larger punctures in addition to those of the general surface; the 6th and 7th do not reach the apex, but are embraced by the remainder on each side; the sutural stria, which is deepest, reaches the scutellum; the sides of the elytra decline sharply, so as to be nearly vertical, and the margin, particularly at the apex, is repanded almost like a hollow shelf. The legs are piceous.

I have named this species in honour of my esteemed friend M. Mulsant of Lyons, who first pointed out characters for the distinction of the species of this genus in his Monograph of it in the 7th volume of the 'Annals of the Society of Agriculture

of Lyons.'

SPHÆRIDIUM, Fab.

1. S. Senegalense, Casteln. vol. ii. p. 61.

Nigrum, nitidum, orbiculare, convexum, subtilissime et dense punctatum, partibus oris, thoracis et elytrorum marginibus atque suturæ apice flavo-testaceis; elytrorum disco macula rufa obscura vix perspicua instructo; subtus obscurum, nigrum, pubescens; pedibus glabris flavo-testaceis, femoribus nigro-fasciatis.

Long. 11 lin., lat. 1 lin.

Castelnau's description omits the scarcely visible red spot on the disk of the elytra, and describes the apex of the suture as having a yellow spot common to both, whereas it is merely the yellow margin of the elytra continued round to the apex and up the suture for a short distance. He does not notice the black band on the thighs; but as this is not well marked on the anterior thighs, it may have escaped him. I have no doubt it is the same species as his; and these discrepancies may be accounted for by the shortness of his description. I do not think we can refer them to variableness in the species, for it appears to be more constant than the other species of the genus, all my specimens being alike; and I have had many through my hands.

#### Paussidæ.

## Paussus, Linn.

1. P. Murraii, Westw. Journ. Linn. Soc. vol. i. p. 74 (1857).

Prothorace bipartito clavaque antennarum postice excavata; piceo-rufus sub lente creberrime punctatus; capite inter oculos transverse elevato et in medio fossulis duabus minimis transversis impresso, angulis posticis parteque postica prothoracis extus porrectis et fere latitudine elytrorum, podice setis longis marginato.

Long. 3 lin., lat. 1 lin.

#### Histeridæ.

# HOLOLEPTA, Payk.

1. H. arcifera, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. i. p. 159.

Oblongo-ovata, complanata, nigra, nitida; fronte æquali; pronoto stria marginali angulata; elytris margine inflexo lævi, stria subhumerali abbreviata, tribus dorsalibus obliquis, secunda appendiculata; propygidio punctis sparsis, duabusque striis oppositis arcuatis cincto; pygidio punctatissimo.

Long. 4½ lin., lat. 2 lin.

Not having previously seen the *H. arcifera* in nature, I cannot speak positively as to my species being it; but the description accords in every respect with that given of that species by M. de Marseul, with the exception of the size, mine appearing to be nearly a third larger.

## MACROSTERNUS, Mars.

1. M. Lafertei, Mars. Ann. d. l. Soc. Ent. d. France, 3 sér. vol. i. p. 243.

Latius ovatus, valde complanatus, nitidus, supra nigro-cæruleus; fronte concava, stria transversa nulla; pronoto lateribus punc-Ann. & Mag. N. Hist. Ser. 3. Vol. iv. 23

tulato, stria marginali interrupta; elytris stria utraque subhumerali integra, dorsali prima integra, secunda antice abbreviata, tertia late interrupta; pygidio punctato utrinque foveolato, tibiis anticis quadridentatis.

Long.  $3\frac{1}{4}$  lin., lat.  $1\frac{3}{4}$ -2 lin,

#### PLACODES, Erich.

1. P. Senegalensis, Payk, Mon. Hist. 13. 5, pl. 4. 5 (1811).

Ovalis, parum convexus, niger, nitidus; fronte impressa, stria sinuata integra; pronoto stria marginali tenui haud interrupta, laterali valida utrinque uncinata; elytris margine inflexo punctato, duabus striis, interna ad suturam prolongata, subhumerali externa postice, interna antice abbreviatis, dorsalibus 1-3 integris, ceteris apicalibus punctatis; propygidio bifoveolato pygidioque punctatis.

Long, 7 lin., lat.  $3\frac{1}{2}$  lin.

## PLATYSOMA, Leach.

 P. Murrayi, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. v. p. 403.

Oblongo-ovatum, depressum, nigrum, nitidum; fronte plana, stria transversa integra, pronoto stria laterali haud interrupta; elytris striis dorsalibus 1-3 integris, quarta dimidiata; pygidio marginato, ocellato-punctato; mesosterno sinuato marginatoque; tibiis anticis 4-dentatis, intermediis 4-, posticis 3-spinosis.

Long. 4 lin., lat. 13 lin.

## PACHYCRÆRUS, Mars.

1. P. cyanescens, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. i. p. 458.

Ovalis, supra parum convexus, cæruleus seu viridis metallicus, nitidus; antennis pedibusque rufo-brunneis; elypeo impresso a fronte distincto stria integra, pronoto lateribus fortius punctato, stria marginali interrupta; elytris striis 1–3 dorsalibus integris, 4<sup>a</sup>, 5<sup>a</sup>, suturali et subhumerali externa dimidiatis; mesosterno antice marginato.

Long.  $2-2\frac{1}{4}$  lin., lat.  $1-1\frac{1}{8}$  lin.

## Continus, Marseuil.

1. C. didymostriatus, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. i. p. 546.

Ovatus, convexus, niger, nitidus, mandibulis bidentatis margina-

tis; fronte stria semicirculari integra; pronoto striis tenuibus, marginali integra, 2 lateralibus ad angulum anticum evanescentibus alterutra in medio redintegrata; elytris striis didymis, suturali, 5 dorsalibus subhumeralique interna integris, externa abbreviata; tibiis anticis tridentatis.

Long. 5 lin., lat. 3½ lin.

## HISTER, Linn.

1. H. major, Linn., Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. ii. p. 173.

Ovato-subquadratus, convexiusculus, niger, nitidus; fronte lata, stria sinuata integra, labro inciso; pronoto fulvo longius cincto, striis lateralibus integris pone oculos interruptis; elytris margine inflexo bisulcato, subhumerali interna et 1-3 dorsalibus integris, ceteris brevibus seu obsoletis; pygidio dense punctato; prosterno lobo brevi acuminato; tibiis anticis 3-dentatis, posticis tuberculato-longispinosis.

Long. 7 lin., lat. 4 lin.

2. H. Calabaricus, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. v. p. 415.

Ovalis, parum convexus, niger, nitidus, antennis pedibusque brunneis; fronte plana stria semicirculari subrecta, mandibulis canaliculatis; pronoto stria laterali externa brevi, interna integra; elytris fossa subhumerali lævi bisulcata, stria subhumerali interna ad humerum producta, 1–3 dorsalibus integris, 4–5 apicalibus, suturali dimidiata; propygidio pygidioque basi parce punctatis, utrinque foveolatis; mesosterno emarginato stria integra; tibiis anticis tridentatis, posticis dense biseriatim spinosis.

Long.  $3\frac{1}{2}-2\frac{1}{2}$  lin., lat.  $2\frac{1}{2}-1\frac{3}{4}$  lin.

This species varies greatly in size, as may be seen from the above dimensions.

3. H. Loandæ, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. ii. p. 236.

Oblongo-ovatus, subconvexus, niger, nitidus; antennis pedibusque rufo-brunneis; fronte impressa, stria retrorsum angulata; mandibulis bidentatis, canaliculatis; pronoto stria laterali interna haud interrupta, externa brevi; elytris fovea marginali 1-sulcata, striis dorsalibus 1-3 integris, 4ª interrupta, 5ª abbreviata, suturali dimidiata; propygidio bifoveolato pygidioque parce punctatis; mesosterno recto, marginato; tibiis anticis tridentatis, posticis biseriatim multispinosis.

Long.  $2\frac{1}{4}$  lin., lat.  $1\frac{1}{4}$  lin.

## CŒLOCRÆRA, Marseul.

1. C. Costifera, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. v. p. 430.

Ovalis, convexa, nitida, nigra, ore antennis pedibusque fuscoferrugineis; fronte punctulata, foveolata marginataque; pronoto rugose punctato, margine laterali elevato, ad angulum bifoveolato; elytris sutura, margine, externa sextaque costis integris, margine inflexo bisulcato; propygidio pygidioque dense punctulatis; metasterno in medio sulcato primoque ventris segmento grosse punctatis; tibiis anticis latis extus multidenticulatis, posticis apicem versus parce spinosis.

Long. 1½ lin., lat. ¾ lin.

#### TRIBALUS, Leconte.

1. T. agrestis, Mars., Ann. d. l. Soc. Ent. d. France, 3 sér. vol. iii. p. 155.

Orbicularis, convexus, niger, nitidus; antennis pedibusque ferrugineis; fronte concava, puncticulata; pronoto punctis parcis et tenuibus, stria marginali interrupta; elytris margine inflexo, bistriato, 2 striis subhumeralibus integris, dorsali unica media brevi, obsoleta, grosse et raro punctatis.

Long.  $1\frac{1}{2}$  lin., lat. 1 lin.

#### NITIDULIDÆ.

#### Carpophilidæ.

# BRACHYPEPLUS, Erich.

#### 1. B. rubidus, mihi.

Nitidus, sat latus et depressus, læte rufo-ferrugineus, capite elytrorumque apice nigris; capite punctato, antice medio leviter elevato. Thorace lato, punctato, postice medio bi-impresso, et angulis posticis excavatis. Scutello lato, fere rotundato. Elytris plus quam sesqui thorace longioribus, rugose punctato-striatis, striis haud apicem et marginem attingentibus, interstitiis leviter, apice et margine dense et rugose punctatis. Abdomine quinque segmentorum composito, primis duobus brevibus, ceteris longioribus, ultimo longissimo, supra quatuor segmentis solum aspectabilibus, aciculariter punctatis, marginatis, apice ultimi segmenti nigricante. Pedibus punctatis; femoribus subtus fere lævibus.

Long.  $3\frac{1}{2}$  lin., lat. 1 lin.

Shining, rather broad and much depressed; of a clear ferruginous red colour, except the head and apical half of the elytra, which are black, and the extreme point of the last segment of the abdomen, which is blackish. Head punctate, impressed on

each side in front, the impressions meeting between the eyes so as to leave a slight elevation like a flat nose, broadest in front; tips of the mandibles dark. Thorax broad, punctate, with the margins edged, bi-impressed on each side of the middle of the base; base slightly emarginate, middle portion straight, and with a slight tendency to project backwards, as in Lebia, and the posterior angles curved very slightly backwards; within the posterior angles is an elongated fovea or flattened hollow extending nearly halfway up along the margin. Scutellum broad, very nearly rounded, so as to look like a small segment of a circle; but the rounding is not quite perfect; it might be resolved into a five-sided figure with the angles rounded, of which the base occupies the anterior Elytra not quite twice the length of the thorax, but very nearly so, roughly punctate-striate, the striæ not reaching the apex nor the margin, both of which are closely and rugosely punctate; the interstices lightly punctate; the sutural striæ deepest on each side of the suture near the scutellum, and there closely punctate; the sides decline suddenly and nearly vertically, and there is a high-raised sharp edge. Abdomen with five segments, of which the first two are short and less firm in texture than the rest, the two next longer and equal to each other, and the last longest; above, the four last segments only are seen\*; the three last are strongly acicularly punctate, and have a raised elevation a short space within the side, and extending across the base of the segment, making a short, projecting, more raised sort of tooth or angle at its marginal angle or termination; the second appears scarcely punctate, and this elevation is wanting in it. Under side and legs punctate, middle of abdominal segments and under side of thighs nearly smooth.

2. B. niger, mihi.

Precedenti valde affinis, sed major, niger et ubique magis fortiter punctatus.

Long. 4 lin., lat. 1\frac{1}{8} lin.

Very closely allied to the preceding, but larger, wholly black, and with the punctation throughout coarser, and every charac-

ter somewhat exaggerated or better defined.

I have hesitated whether to give this as a variety of the preceding or as a different species, but have come to the conclusion that it is to be viewed as distinct. I have received only two specimens of each; the characters, such as they are, are constant in both; and although I can find no better nor more

\* It is possible that in life only the three last are seen; they are of a firmer texture, are punctate, and have the raised margin. It is therefore probably due to the relaxation of the connecting tissues, caused by my specimens having come home in spirits, that the second segment is partially seen from above in them.

distinguishing characters than those above given, still there is something in the look of the two which satisfies me that they are not the same. This sort of *primd facie* evidence is often as convincing to an entomological eye as more defined and less empirical characters.

[To be continued.]

XXXVII.—Additional Observations upon the Genera Aptandra, Cathedra, Liriosma, Leretia, Poraqueiba, and Emmotum. By John Miers, F.R.S., F.L.S., &c.

#### APTANDRA.

In completing the drawing to illustrate this genus, as described in this work (2nd ser. vii. 201), I have been able to add the details since obtained of the structure of its fruit and seed. This information, which fixes beyond doubt the position of Aptandra in the system, is derived from the analysis of the only fruit that accompanied a specimen of the Heisteria tubicina of Pöppig, which I received from Mr. Spruce. This plant is described by Pöppig in his 'Nov. Gen.' iii. 35, and is figured by him in plate 241, but only from immature fruit. We have satisfactory proof that it really belongs to Aptandra by the presence of an ovary in the same specimen, which is somewhat advanced in growth, and around the style of which the peculiar monadelphous staminal tube still remains, which is precisely similar to that I have shown in Aptandra Spruceana. The calyx, which in the flower is barely a line long, in the fruit grows to a very large size, becoming campanular with an entire spreading mouth, and it half envelopes the dry globular drupe, which is nearly an inch in diameter. Its pericarp is smooth, coriaceous, indehiscent, half a line in thickness, unilocular, and monospermous: the nucleus, in this instance, was greatly shrivelled, and in consequence much corrugated, and was covered with mildew, so that the nature of its decayed seminal envelopes could not be ascertained: a firm integument adhered closely to the pericarp, which appeared to me to be the external tunic of the seed rather than of the endocarp; but of this I cannot be sure: the nucleus adhered to the bottom of the cell by a round cicatrix, which appears to be the remnant of the free central placenta, upon which the ovules are attached in the floral ovary. The nucleus consisted of a homogeneous fleshy substance, which, after being well macerated and cut open transversely, showed no signs of any embryo; but in its centre was a large vacuity, the sides of which were pressed together by the shrinking of the mass: this vacuity presented a very polished surface; and from it several rays branched towards the circumference, leaving so many fleshy